

UF₆ Cylinder Storage Yard Descriptions For Paducah

At the Paducah Gaseous Diffusion Plant (see Fig. 1) there are eleven existing DOE UF₆ cylinder storage yards which currently store approximately 31,200 UF₆ cylinders. The DOE cylinder yards are designated as follows: C-745-C, C-746-D, C-745-F, C-745-G, C-745-K, C-745-L, C-745-M, C-745-N, C-745-P, C-745-S, and C-745-T. All but one (C-745-C) of the DOE cylinder storage yards are located in the southeast quadrant of the plant immediately south of the C-333 Process Building. The DOE cylinder storage yard complex located in the southeast quadrant of the plant is secured within a fence as a property protection area. This area can be accessed from the Plant security fence at Gates 49 and 50 and can be accessed from inside the plant controlled access area by 10 interior gates located at various points along the interior fence line. The only DOE cylinder storage yard not located within this area is C-745-C which is located in the northwest quadrant of the plant north of the C-404 Low Level Radioactive Waste Burial Yard (Abandoned) and south of the C-746 scrap yards. The C-745-C cylinder storage yard can be accessed from its north, south and west sides. The DOE cylinder storage yards are posted as radioactive material areas. Hazard communications signs for uranium hexafluoride are also posted within the yards. TLDs are required for access. The cylinder yards are Category 2 nuclear facilities by PAAA requirements. In addition, the following DOE cylinder storage yards are located within Solid Waste Management Unit 193: C-745-D, C-745-F, C-745-G, C-745-K, C-745-L, C-745-M, C-745-N, C-745-P, and C-745-S.



Figure. 1. Aerial view of Paducah Gaseous Diffusion Plant

In addition to the DOE cylinders stored within the eleven DOE cylinder storage yards, DOE is temporarily storing approximately 7,300 UF₆ cylinders in the following five USEC leased cylinder storage yards: C-745-B, C-745-E, C-745-R, C-745-Q and C-745-U. The C-745-B cylinder storage yard is located immediately west of the DOE C-745-C cylinder storage yard in the northwest quadrant of the plant. There are DOE cylinders currently stored within a DOE Material Storage Area (DMSA 15) which is located immediately north of the C-745-B cylinder storage yard. The C-745-E

cylinder storage yard is located on the east perimeter of the plant south of the C-360 Toll Transfer and Sampling Building. The C-745-Q and C-745-R cylinder storage yards are located immediately east of the DOE cylinder yard complex in the southeast quadrant of the plant. The C-745-U cylinder storage yard is located immediately north of DOE's C-745-T cylinder storage yard within the fenced DOE cylinder yard complex.